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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/553,283	07/31/2006	Toyoshi Tokimoto	1248-0823PUS1	8628

2292 7590 07/22/2010

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EXAMINER	
STRONCZER, RYAN S	

ART UNIT	PAPER NUMBER
2425	

NOTIFICATION DATE	DELIVERY MODE
07/22/2010	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

Office Action Summary	Application No.	Applicant(s)	
	10/553,283	TOKIMOTO ET AL.	
	Examiner	Art Unit	
	Ryan Stronczer	2425	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *3/11/2010*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1,3,13 and 15-17* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,3,13 and 15-17* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1, 3, and 15-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Uchida (Pub. No.: US 2002/0054028) and further in view of Labeeb et al. (Pub. No.: US 2003/0093792) and Chimoto (US Pat. No. 6,532,590).

As to claim 1, which recites,

> **a wireless system comprising:**
> **a base device receiving a first video data of television broadcast and electronic program guide (EPG) data related to the first video data; and**
> **a wireless terminal for transmitting/receiving data to/from the base device**
> **the base device including:**
> **a transmitting unit wirelessly transmitting the first video data and the EPG data to the wireless terminal;**
> **and an input terminal which is connectable with a set-top box,**
> **the wireless terminal including:**
> **a receiving unit receiving, from the base device, the first video data and the EPG data;**
> **a first video generating unit generating a first video image based on the first video data; a second video generating unit generating a second video image based on the EPG data;**
> **a video superposing unit superposing the second video image on the first video image;**
> **and a display unit displaying the superposed video image;**
> **and a rewritable nonvolatile memory storing the EPG data received by the receiving unit,**
> **the second video generating unit generating the second video image based on the EPG data stored in the nonvolatile memory,**

Fig. 1 of Uchida, as cited previously, teaches the recited wireless system. The base station 200 coupled to of Fig. 1 is equivalent to the recited base device. As to the limitations that the base device includes **"a transmitting unit wirelessly transmitting the first video data and the EPG data to the wireless terminal and an input terminal which is connectable with a set-top box,"** Uchida teaches that the base device includes multicoupler 210 and transmission/reception antenna which enable communication between the base device and the wireless display device 100 [0062-63]. As to the recited input terminal which is connectable with a set-top box, Fig. 1 of Uchida teaches set-top box 300, *"serving as an exemplary input apparatus [to base device 200]"* [0028]; Fig 3 of Uchida further teaches that the base apparatus includes *"input terminal 204 for a video signal (Vd)* [and] *input terminal 205 for an audio signal (Au)"* [0058]. As to the amended limitation that the base device transmits "the first video data and the EPG data to the wireless terminal," Uchida teaches:

> Accordingly, the on-screen display processing section 306 synthesizes message information with the video signal or forms a video signal to be used to display an electronic program guide and outputs this synthesized or formed signal…The video signal output from the set-top box 300 is then supplied to the base apparatus 200 through the input terminal 204 of the base apparatus 200 as described hereinabove.
>
> Also, it is possible to provide an electronic program guide display key on the control panel CP so that an electronic program guide is formed by the set-top box 300 and displayed on the LCD 107 of the display apparatus 100 through the base apparatus 200. [0074, 0091]

The display apparatus 100 taught by Uchida is the equivalent of the recited wireless terminal. As to the recited "receiving…video data and EPG data" Uchida teaches, as cited above, that the display device is capable of displaying video and EPG

data received from the wireless device [0074, 91]. As to the recited **"second video generating means"** and **"video superimposing means,"** Fig. 2 of Uchida teaches that the display terminal contains an OSD (on-screen display) processing section which would allow the display device to display the EPG to the user.

As to the recited **"rewritable nonvolatile memory for storing the EPG data received by the receiving means, the second video generating means generating the second video image based on the EPG data stored in the nonvolatile memory,"** Labeeb, as analyzed above, teaches storing an EPG template at the receiving device. Though Labeeb teaches storing the template at the STB as opposed to at the cable headend in a conventional television broadcasting system, Examiner maintains that it would have been obvious to one of ordinary skill in the art at the time of the invention to utilize the Labeeb's technique of storing the EPG template at the receiving device in a home environment, such as taught by Uchida, where the display device 100 functions as the receiving device and the STB 300 effectively functions as a local server or headend in that it is distributing video content to one or more remotely located devices.

One of ordinary skill in the art would have recognized that the ROM of Uchida's display device, which stores the template and display information for superimposing the control panel on the video image (see, e.g., 0043 and 0052), could have been modified to incorporate the EPG template of Labeeb. Labeeb teaches that storing the template at the receiving device reduces the bandwidth used by the system and Examiner maintains that applying the technique of Labeeb in the system of Uchida would have

provided the benefit of reducing the transmission bandwidth from Uchida's STB to display device and would have increased system response time for the user by decreasing overall system latency.

Fig. 1 of Uchida teaches that the OSD processor superimposes the on-screen display (in this case, a remote control) over the video image; however, Uchida does not explicitly teach overlaying the EPG. In an analogous, art, Fig. 8 of Chimoto teaches a display unit that superimposes an EPG over a video signal, similarly to how Uchida superimposes its control panel over the video signal being displayed. As Uchida teaches that the display device is operable to display an EPG and also teaches that said display device comprises an OSD processor that is operable to overlay an image over a video signal, it would have been obvious to one of ordinary skill in the art at the time of the invention to modify Uchida's OSD processor with the overlay EPG taught by Fig. 8 of Chimoto to superimpose the EPG image over the video signal. This would have been desirable as it would have allowed the user to view the television listings without interrupting viewing the program currently being displayed.

As to claim 3, Labeeb explicitly teaches that system may store an EPG template in memory:

> Set top box **34** may also comprise a nonvolatile template memory **38** for storing the template in which the EPG data is to be inserted for display to the viewer on the viewer's television **40**. In this manner, a video signal containing the template display data need not be continuously retransmitted to the set top box **34**, thereby saving more bandwidth. [0167]

Though Labeeb teaches storing the template at the STB as opposed to at the cable headend in a conventional television broadcasting system, Examiner maintains

that it would have been obvious to one of ordinary skill in the art at the time of the invention to utilize the Labeeb's technique of storing the EPG template at the receiving device in a home environment, such as taught by Uchida, where the display device 100 functions as the receiving device and the STB 300 effectively functions as a local server or headend in that it is distributing video content to one or more remotely located devices.

One of ordinary skill in the art would have recognized that the ROM of Uchida's display device, which stores the template and display information for superimposing the control panel on the video image (see, e.g., 0043 and 0052), could have been modified to incorporate the EPG template of Labeeb. Labeeb teaches that storing the template at the receiving device reduces the bandwidth used by the system and Examiner maintains that applying the technique of Labeeb in the system of Uchida would have provided the benefit of reducing the transmission bandwidth from Uchida's STB to display device and would have increased system response time for the user by decreasing overall system latency.

As to newly added claim 15, which recites, **"wherein the second video image is superposed** [sic] **on the first video image based on a user input,"** paragraph 0091 of Uchida, cited above, teaches that the EPG can be displayed based on a user pressing an EPG key on the control panel of wireless unit 100.

As to new claim 16, which recites, **"wherein the second video image is superposed** [sic] **on the first video image based on a timing control signal,"** Uchida teaches displaying a superimposing a second video image over a first image, but does

not explicitly teach that said superimposing is based on a timing control signal, as recited; however, the Examiner takes Official Notice that it is well-known in the art for a television or equivalent display device to employ a time-out function such that a menu or EPG is only displayed for a finite amount of time without user input before the display device stops displaying said EPG. That is, the EPG (equivalent to the recited second video image) is superimposed on the first video image as long as the device determines that said time-out period has not expired. It would have been obvious to one of ordinary skill in the art at the time of the invention to incorporate said time-out function into the display device of Uchida to reduce power consumption by not unnecessarily utilizing the OSD processor of Uchida's display device and to prevent the display of the video program from being obstructed indefinitely. One of ordinary skill in the art at the time of the invention would have recognized this as a combination of known elements in the art that would have yielded predictable results.

As to claim 17, which recites, **"wherein the second video image is superposed** [sic] **on the first video image based on a user input and a timing control signal,"** the rejection of claims 15 and 17 are incorporated herein. Displaying an EPG in response to a user pressing an EPG button on a control panel is equivalent to superimposing the second video image based on a user input; continuing to display said EPG until a delay time-out function expires is equivalent to superimposing the second video image based on a timing control signal.

Claim Rejections - 35 USC § 103

Claim 13 is rejected under 35 U.S.C. 103(a) as being unpatentable over Uchida in view of Labeeb in view of Chimoto as applied to claim 1 above, and further in view of Yap et al. (Pub. No.: 2002/0092021).

New claim 13 recites the wireless terminal of claim 1, further including:

> **a controller that determines whether EPG data has been stored in the rewritable nonvolatile memory, wherein**
> **the EPG data is read out of the rewritable nonvolatile memory when the EPG data has already been stored in the rewritable nonvolatile memory, and**
> **an obtaining EPG command is transmitted, from the wireless terminal, for obtaining EPG data when the EPG data has not been stored in the rewritable nonvolatile memory.**

As analyzed above, Uchida teaches that the wireless display comprises a memory device, but does not explicitly teach the recited controller. In an analogous art, Fig. 1 Yap teaches a display device substantially similar to that of Uchida that downloads EPG data. Fig. 4 of Yap teaches a method for determining if said downloaded EPG data needs to be updated. Specifically, Yap teaches:

> Step 430 then determines whether there is a match between the consumer selections and/or criteria and the electronic program guide 80. If there is no match, then the process may continue by proceeding to step 440 which decides whether to update the electronic program guide 80…If the electronic program guide 80 is to be updated, then the process proceeds to step 400 which downloads the electronic program guide 80. [0070]

As analyzed above, the combination of Uchida and Labeeb teaches that it is desirable to store the EPG template at the wireless device to reduce bandwidth consumed by eliminating the need to retransmit said template from the base device to the wireless display device. One of ordinary skill in the art at the time of the invention

would have recognized that a similar benefit could be gained from also storing the EPG data at the wireless device. It would have been obvious to one of ordinary skill in the art at the time of the invention to modify the wireless display CPU 131 (Uchida, Fig. 2) to perform the method taught by Yap. Doing so would allow the wireless device of Uchida to request updated EPG data from the STB, through the base device, and when said EPG data need be updated. One of ordinary skill in the art at the time of the invention would have recognized this as a combination of known elements in the art that would have yielded predictable results.

Response to Arguments

Applicant's arguments filed 15 July 2009 have been fully considered but they are not persuasive. With respect to claim 1, Applicant alleges:

> The Applicants respectfully submit that the Office Action is based upon a selective combination of features found in the two references, and that such selective combining is impermissible. As stated in Interconnect Planning Corp. v. Feil, 774 F.2d 1132, 1143 (Fed. Cir. 1985), "When prior art references require selective combination by the court to render obvious a subsequent invention, there must be some reason for the combination other than the hindsight gleaned from the invention itself." It is respectfully submitted that the Office Action cites the Uchida patent, and then utilizes the present application as a road map to selectively replace various features of the Labeeb reference. (Remarks, pg. 6)

In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does

not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

Labeeb teaches that storing the EPG template at the user's STB instead of at the network headend is desirable, as doing so decreases the bandwidth usage for the system [0167]. Uchida teaches a display device comprising, *inter alia*, various storage means and an OSD processing section. Uchida further teaches that said OSD apparatus is operable to display *"various messages or an electronic program guide"* [0073]. The MPEP instructs:

> The focus when making a determination of obviousness should be on what a person of ordinary skill in the pertinent art would have known at the time of the invention, and on what such a person would have reasonably expected to have been able to do in view of that knowledge. This is so regardless of whether the source of that knowledge and ability was documentary prior art, general knowledge in the art, or common sense. (MPEP § 2141, emphasis added)

The Examiner maintains, as a matter of both general knowledge in the art and common sense, that in modifying the system of Uchida with the teachings of Labeeb to store the EPG template at the display device it would have been obvious to one of ordinary skill in the art at the time of the invention to store said EPG template in the storage means located in the display device and to utilize the OSD apparatus to display said EPG.

Further regarding claim 1, Applicant contends:

> The Examiner alleges that it would be obvious to combine Uchida with Labeeb to "increas[e] system response time for the user by decreasing overall system latency" (See Office Action dated April 15, 2009, page 6, lines 3-4). It is respectfully submitted that the rejection of claim 1 is a

> blatant string of substitutions gleaned from and motivated by the Applicants' own patent application. The Office Action fails to show that the prior art provides the teaching or suggestion to make the claimed combination and the reasonable expectation of success. The suggestion to make the claimed combination and the reasonable expectation of success cannot be based on Applicants' disclosure. Accordingly, it is respectfully submitted that claim 1 is patentable over the impermissible combination of references cited against claim 1. (Remarks, pg. 6)

As cited in the previous Office Action, Labeeb teaches that storing the EPG template at the user's STB instead of at the network headend is desirable as doing so decreases the overall bandwidth consumed by eliminating the need to constantly retransmit said template from the headend to the STB [0167]. The Examiner maintains that it would have been obvious to one of ordinary skill in the art at the time of the invention that a similar benefit would be gained by storing the EPG template at Uchida's display device instead of at Uchida's base unit. In both cases, the overall bandwidth usage is reduced because the EPG template need not be continuously retransmitted to the display device (Labeeb's STB or Uchida's display device) from the transmitting device (Labeeb's headend or Uchida's base device). The Examiner maintains, as stated in the previous Office Action, that it would have been obvious to one of ordinary skill in the art at the time of the invention as a matter of general knowledge in the art that reducing the bandwidth usage in a system would have the desirable effect of increasing the system response time (see MPEP § 2141).

Contact

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ryan Stronczer whose telephone number is (571) 270-

3756. The examiner can normally be reached on 7:30 AM - 5:00 PM (EDT), Monday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Brian T. Pendleton can be reached on (571) 272-7527. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Ryan Stronczer/
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